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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/584,000

06/22/2006

Akihiko Iguchi

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RATNERPRESTIA

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EXAMINER

CHEN, SHIH CHAO

ART UNIT

PAPER NUMBER

2821

MAIL DATE

DELIVERY MODE

08/27/2009

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/584,000	Applicant(s) IGUCHI ET AL.	
	Examiner Shih-Chao Chen	Art Unit 2821	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 22 June 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-26 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,3-7,9-11,14,16-20 and 22-24 is/are rejected.
- 7) ☒ Claim(s) 2,8,12,13,15,21,25 and 26 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 22 June 2006 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>6/22/06</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Priority

1. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

Information Disclosure Statement

2. The information disclosure statement (IDS) submitted on 06/22/2006 has been considered by the examiner.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. Claims 1, 3-7, 9-11, 14, 16-20, 22-24 are rejected under 35 U.S.C. 102(b) as being anticipated by Lehtola (U.S. Patent No. 6,476,769).

Regarding claim 1, Lehtola teaches in figures 1-3 an antenna device [1] comprising: a first radiation conductor [20] operating at a first frequency; a first feeding lead wire [24] coupled to the first radiation conductor; a first matching circuit (i.e. a transmission line of the first radiation conductor [20]; See page 7, lines 15-17 of Applicant's specification) coupled to the first feeding lead wire; a first short-circuit lead wire [G1] coupled to the first radiation conductor and grounded; a second radiation conductor [40] disposed in a state in which it is insulated from the first radiation conductor and operating at a second frequency that is higher than the first frequency;

a second feeding lead wire [50] coupled to the second radiation conductor;
a second matching circuit (i.e. a transmission line of the second radiation conductor [40]; See page 7, lines 15-17 of Applicant's specification) coupled to the second feeding lead wire; a second short-circuit lead wire [G2] coupled to the second radiation conductor and grounded; and a transmitting/receiving circuit [70, 72] coupled to the first matching circuit and the second matching circuit.

Regarding claim 3, Lehtola teaches in figures 1-3 the antenna device of claim 1, wherein the first short-circuit lead wire [24] and the second short-circuit lead wire [50] are coupled to each other at their bottom parts [5].

Regarding claim 4, Lehtola teaches in figures 1-3 the antenna device of claim 1, wherein the first radiation conductor [20] and the second radiation conductor [40] are formed on a surface (See FIG. 1).

Regarding claim 5, Lehtola teaches in figures 1-3 the antenna device of claim 1, wherein the first radiation conductor [20] and the second radiation conductor [40] are formed on different surfaces (See col. 4, lines 31-37).

Regarding claim 6, Lehtola teaches in figures 1-3 the antenna device of claim 1, wherein at the first frequency, an impedance of the second radiation conductor [40] is higher than an impedance of the first radiation conductor [20].

Regarding claim 7, Lehtola teaches in figures 1-3 the antenna device of claim 1, wherein at the second frequency, an impedance of the first radiation conductor [20] is higher than an impedance of the second radiation conductor [40].

Regarding claim 9, Lehtola teaches in figures 1-3 the antenna device of claim 1, wherein the first matching circuit comprises a high-pass circuit, and the second matching circuit comprises a low-pass circuit, respectively (Examiner note: it is inherent to have the high-pass or the low-pass circuit for the matching circuit).

Regarding claim 10, Lehtola teaches in figures 1-3 the antenna device of claim 4, wherein a terminal (See FIG. 2) for holding an antenna element [10, 40] is provided in a region facing a region in which the first and second feeding lead wires [22, 50] and the first and second short-circuit lead wires [G1, G2] are coupled, respectively (See FIG. 2).

Regarding claim 11, Lehtola teaches in figures 1-3 the antenna device of claim 1, wherein at the first frequency, a load impedance of the transmitting/receiving circuit [70] is substantially equal to an impedance from the first matching circuit to the first radiation conductor [20], and at the second frequency, a load impedance of the transmitting/receiving circuit [72] is substantially equal to an impedance from the second matching circuit to the first radiation conductor [20].

Regarding claims 14, 16-20 and 22-24, Lehtola teaches in figures 1-3 a wireless communication device (See col. 5, lines 28-30) using the antenna device [1].

Allowable Subject Matter

5. Claims 2, 8, 12-13, 15, 21 and 25-26 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Correspondence

Art Unit: 2821

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Shih-Chao Chen whose telephone number is (571) 272-1819. The examiner can normally be reached on Monday-Thursday from 7 AM to 5:30 PM, Fri. off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Douglas W. Owens can be reached on (571) 272-1662. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Shih-Chao Chen
Primary Examiner
Art Unit 2821

SXC
August 25, 2009
/Shih-Chao Chen/
Primary Examiner, Art Unit 2821